

HDRU LIBRARY

DO NOT REMOVE

SEASON PREFERENCES OF BEAVER TRAPPERS IN NORTHERN NEW YORK

by

N. A. CONNELLY, D. J. DECKER, AND K. G. PURDY

February 1986

COPY



Series No. 86-1



Human Dimensions Research Unit
Department of Natural Resources
New York State College of Agriculture and Life Sciences
A Statutory College of the State University
Cornell University, Ithaca, N. Y.



FINAL REPORT

STATE: New York

PROJECT NUMBER: W-146-R-11

PROJECT TITLE: Public Attitudes Toward Wildlife and Its Accessibility

STUDY NUMBER AND TITLE: VIII - Identifying Attitudes and Values Toward
Species and Their Management

JOB NUMBER AND TITLE: VIII-10 - Human Dimensions Studies to Meet the Data
Needs Identified in Species Management Plans

SUBMISSION DATE: February 1986

PREPARED BY: Nancy A. Connelly
Nancy A. Connelly
Research Aide
Department of Natural Resources
Cornell University

Daniel J. Decker
Daniel J. Decker
Research Associate
Department of Natural Resources
Cornell University

Ker G. Purdy
Ker G. Purdy
Research Support Specialist
Department of Natural Resources
Cornell University

APPROVED BY: George F. Mattfeld
George F. Mattfeld
Environmental Management Specialist III
Bureau of Wildlife (NYSDEC)

Date

Stuart L. Free
Stuart L. Free
Chief Wildlife Biologist
Bureau of Wildlife (NYSDEC)

Date

ABSTRACT

A self-administered, mail-back questionnaire survey of beaver trappers was conducted in Fall 1985 to determine trappers' preferences for beaver trapping seasons in Northern New York. A response rate of 80% was achieved (611 useable responses). Most trappers preferred the season opening to occur between the third week of October and the second week of November. A slight majority of trappers (54%) surveyed opposed a split season; 39% preferred a split season. Most trappers' season preferences reflected their belief regarding timing for receiving the best pelt prices. Other important reasons included: to engage in other kinds of trapping simultaneously, to catch the most beaver, to coincide with preferred weather conditions, and to ensure preferred conditions to reach trapping areas. Data are reported by Wildlife Management Unit to facilitate decision making on a Management Unit basis.

TABLE OF CONTENTS

	<u>Page</u>
Abstract	i
Table of Contents	ii
List of Tables	iii
List of Figures	iv
Introduction	1
Methods	1
Results	3
Survey Response	3
Beaver Trapper Profile	3
Trapper Activity	4
Trapping Conditions Preferred	11
Season Opening Preferences	13
Summary and Conclusions	24
Appendix A: Questionnaire and Cover Letters	25

LIST OF TABLES

Table	Title	Page
1	Organizational Affiliation of Respondents	4
2	The Number of Days Traps Were Set for Beaver, by Season	5
3	Estimates of the Number of Beaver Trapped Each Season .	6
4	The Percent of Respondents Who Trapped in Each WMU in 1984-85	6
5	WMU Trapped Most Frequently in 1984-85, by WMU of Trapper's Residence	7
6	Percent of Trappers Who Trapped Other Kinds of Furbearers During the Past 3 Seasons, by the WMU Where the Trapping Occurred	11
7	Trapping Conditions Preferred, by Trappers with Differ- ent Levels of Trapping Success in 1984-85, and Overall Preference	12
8	Trapping Conditions Preferred, by WMU Trapped Most Frequently During the 1984-85 Season	13
9	Preference for Season Opening Date by WMU	14
10	Respondents Who Preferred a Split Season and Volunteered a Date for the Opening of the Second Season, by WMU . .	16
11	Opening Date Preferences for WMUs 1 and 2, by Whether or Not the Respondent Trapped in that WMU in 1984-85 .	17
12	Reasons for Season Opening Preferences and Rank of the Most Important Reason	18
13	The Five Most Important Reasons for Season Opening Preference by the Date of Preference	21
14	Trapping Conditions Preferred by Month of Season Opening for Those Trappers Whose Most Important Reason for Season Opening Preference was Trapping Conditions .	22
15	Time of Year Beaver Should be Taken to Receive the Best Pelt Price as Indicated by Those Trappers Whose Most Important Reason for Season Preference was "to Get the Best Beaver Pelt Price"	22
16	Perceived Time of Year Beaver and Otter Should be Taken to Receive the Best Price	23

LIST OF FIGURES

<u>Figure</u>	<u>Figure</u>	<u>Page</u>
1	Northern New York Study Area with WMU Boundaries . . .	2
2	The Percent Who Trapped in Each WMU, by WMU of Residence	8

INTRODUCTION

Management of beaver (Castor canadensis) in the 6 Wildlife Management Units (WMUs) of Northern New York requires the collection and assessment of human sociological information as well as biological data about the beaver population. One group of people of particular concern to furbearer management biologists with the New York State Department of Environmental Conservation (DEC) is trappers.

Trapping seasons and harvest regulations need to be established in accordance with the reproductive biology and population dynamics of beaver to assure the integrity of this furbearer resource. However, within these constraints there is some leeway to accommodate the preferences of beaver trappers. Thus, this study was requested by DEC biologists to obtain input from trappers regarding their recent beaver trapping activities in Northern New York as well as their preferences for season opening dates. In addition, furbearer managers wanted to gain a better understanding of the reasons for trappers' preferences.

METHODS

A mail questionnaire was sent to all beaver trappers who turned in a pelt tag (i.e., successful trappers) for the 1984-85 season in WMUs 1 through 6 (Fig. 1). The total initial sample size was 774. Fifteen cases were later omitted from the sample because these respondents reported that they did not successfully trap any beaver in 1984-85. We believe these discrepancies were a likely result of confusion on the part of the respondent in recognizing that 1984-85 was a previous trapping season and not an upcoming season.

Wildlife Management Units (WMU's) in Northern New York

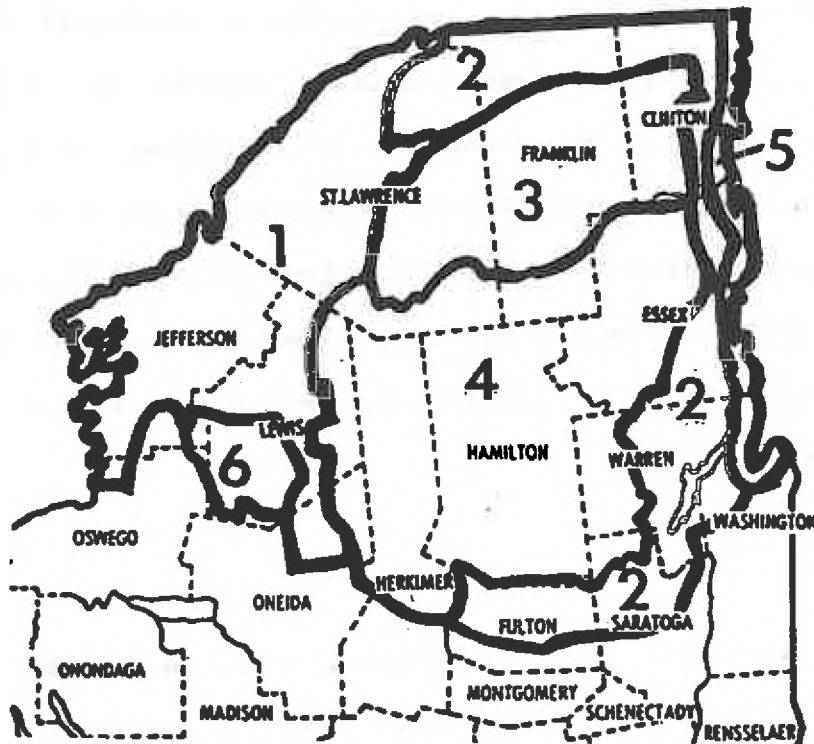


Figure 1. Northern New York Study Area with WMU Boundaries.

The mailing chronology for the survey was as follows:

- * 9 October 1985 - cover letter and questionnaire
- * 18 October 1985 - reminder letter to nonrespondents
- * 29 October 1985 - cover letter and questionnaire to nonrespondents
- * 7 November 1985 - reminder letter to nonrespondents

Copies of the questionnaire and letters are in Appendix A.

The data collected were coded, keypunched, and stored on a magnetic computer tape. Analysis was conducted using the SPSSX (Statistical Package for the Social Sciences, Version X) computer program package. Statistical tests (such as chi-square) were used where appropriate.

RESULTS

Survey Response

An initial sample size of 774 resulted in 7 undeliverable questionnaires, 15 unuseable questionnaires (discussed in Methods), and 611 codeable questionnaires. This produced an 80% useable return rate from the adjusted sample of 767. Because of the high rate of response, nonresponse bias was not investigated.

Beaver Trapper Profile

It is important to keep in mind that the respondents to the survey were successful beaver trappers in 1984-85; therefore their characteristics and preferences do not represent those trappers who were unsuccessful in 1984-85. Most respondents had considerable beaver trapping experience. Half of the respondents had trapped beaver for 10 or more years (\bar{x} = 14 years; range = 1 to 65 years). Forty percent of the sample lived in WMU 1, 19% in WMU 2, 14% in

WMU 3, 16% in WMU 4, 2% each in WMU 5 and 6, and 7% in other parts of New York State. Thirty-eight percent of the sample belonged to at least 1 trapping organization. For those respondents who belonged to an organization, 69% were members of the New York State Trappers Association (Table 1). The next largest organizational affiliation was the National Trappers Association with 38%. There appeared to be a trend of increasing organizational affiliation among more experienced trappers. Thirty-one percent of respondents who had trapped for 1 to 4 years, 34% of those who had trapped for 5 to 9 years, and 46% of those who had trapped for 10 or more years belonged to an organization.

Table 1. Organizational Affiliation of Respondents.

Organization	% of All Respondents	% of Affiliated Respondents
NYS Trappers Association	25.7	68.9
National Trappers Association	14.1	37.7
County or Local Organization	9.7	25.6
Furtakers of America	5.1	13.6
Other	1.7	4.8
n	611	228

Trapping Activity

Knowledge about a respondent's extent of trapping activity provides a context for understanding their preference for trapping conditions and season opening dates. Over two-thirds of the trappers surveyed (68%) had set traps during the previous 3 seasons. Of the remaining trappers, 16% trapped only in 1984-85 and 16% trapped in 1984-85 and 1 other of the previous 2 seasons.

Table 2 shows the number of days in which traps were set during each of the 3

seasons. It should be noted that for the 1982-83 and 1983-84 seasons, the percentage of individuals setting traps is not representative of successful trappers for those seasons because of the population sampled. The percents do, however, reflect variability in trapping effort for the group of trappers who were successful in 1984-85. Of greater interest may be the consistency over time of the mean days trapped during each particular season. The mean number of days during which respondents set traps for beaver in each season was about 18 days. In 1984-85 this represented a total of 9,455 days of trapping effort.

Table 2. The Number of Days Traps Were Set for Beaver, by Season.

Number of Days Traps Set for Beaver	Season		
	1982-83	1983-84	1984-85
	%		
Did not trap	24	19	a
1-10 days	16	19	26
11-15 days	22	21	25
16-24 days	15	16	21
25+	16	18	21
All season (nonnumeric responses)	7	7	7
	100	100	100
Mean days ^b	18.1	17.9	17.8
n	383	416	531

^aAs defined by sample selection, all respondents trapped in 1984-85.

^bFor those trappers giving a valid number greater than 0.

Both the mean number of beaver trapped (14 to 15) and the median number trapped (10 to 11) were consistent over the 3 seasons (Table 3). In 1984-85 a total of 8,431 beaver were trapped. Another estimate of trapping success which

was comparable between seasons was the number of beaver trapped per day of effort. This number also had a small range (0.81 to 0.89 trapped/day of effort) over the three seasons.

Table 3. Estimates of the Number of Beaver Trapped Each Season.

Number of Beaver Trapped	For trappers who set traps in		
	1982-83	1983-84	1984-85
Mean # beaver trapped	14.8	14.1	14.7
Median # beaver trapped	11.0	10.0	10.0
# beaver trapped/day of effort	0.83	0.81	0.89
n	396	438	580

Trapping activity was also examined in terms of the use of each WMU in Northern New York. Table 4 shows that WMU 1 was most popular with 46% of respondents having trapped there in 1984-85. WMU 4 was second with 30% of respondents having some trapping activity there in 1984-85. Thirty percent of respondents trapped in more than 1 WMU; 26% trapped in 2 WMUs and 4% trapped in 3 or 4 WMUs in 1984-85.

Table 4. The Percent of Respondents Who Trapped in Each WMU in 1984-85.

WMU	% Who Trapped in WMU in 1984-85
1	46.2
2	22.7
3	21.0
4	29.7
5	3.8
6	6.4

Note: Percentage does not total 100% because respondents could trap in more than one WMU.

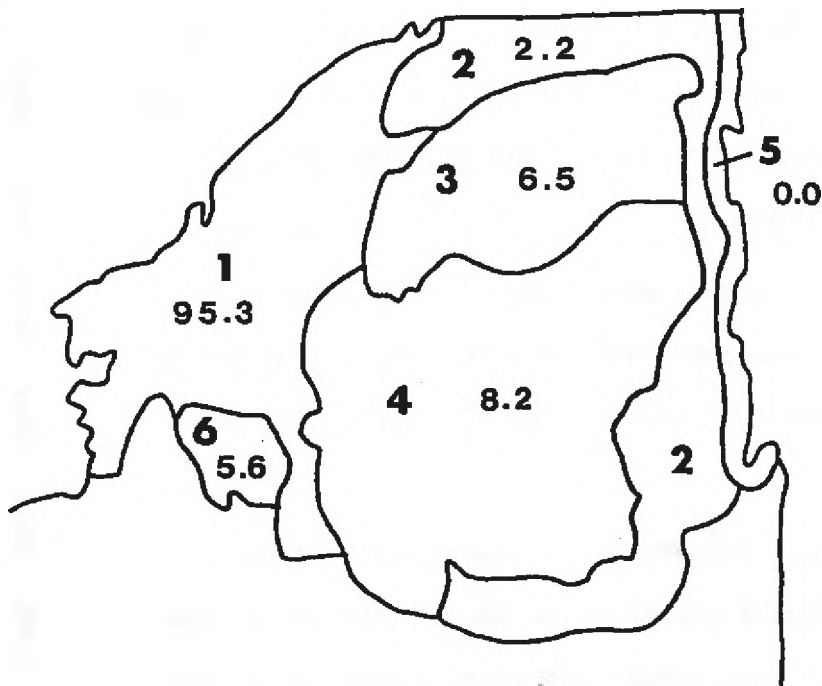
How far did trappers range from their WMU of residence to engage in beaver trapping? As shown in Figure 2, 95% of the residents of WMU 1 trapped in their home WMU and only a small percentage trapped outside of WMU 1. There was a shift in WMU 2 where larger percentages (e.g., 24% and 18%) trapped outside of their WMU of residence. WMUs 3 and 4 were similar to WMU 1 with only 10% to 20% of the residents reporting trapping activity in other WMUs. For residents of WMU 5, WMU 6, and other parts of New York State, care should be taken when examining the results of this analysis because of the small sample size in each group.

Table 5 shows the WMU trapped most frequently by respondents during the 1984-85 season. The majority of trappers who lived in WMUs 1 through 4 spent the most time trapping in their WMU of residence. Of those 4 WMUs, trappers who lived in WMU 2 were the most likely to spend their time trapping in other WMUs. Comparisons with the previous 2 seasons showed that the WMU in which trappers spent the most time trapping had not changed over that period of time.

Table 5. WMU Trapped Most Frequently in 1984-85, by WMU of Residence.

WMU of Residence	WMU Most Frequently Trapped in 1984-85						Total	n
	1	2	3	4	5	6		
	%							
1.	85.7	0.0	4.3	6.2	0.0	3.7	100.0	161
2	5.3	70.7	12.0	6.7	5.3	0.0	100.0	75
3	2.0	3.9	78.4	15.7	0.0	0.0	100.0	51
4	4.5	6.1	4.5	83.3	0.0	1.5	100.0	66
5	0.0	42.9	14.3	0.0	42.9	0.0	100.0	7
6	0.0	0.0	0.0	12.5	0.0	87.5	100.0	8
Outside study area	31.4	14.3	2.9	37.1	0.0	14.3	100.0	35

Residents of WMU 1 n=232



Residents of WMU 2 n=106

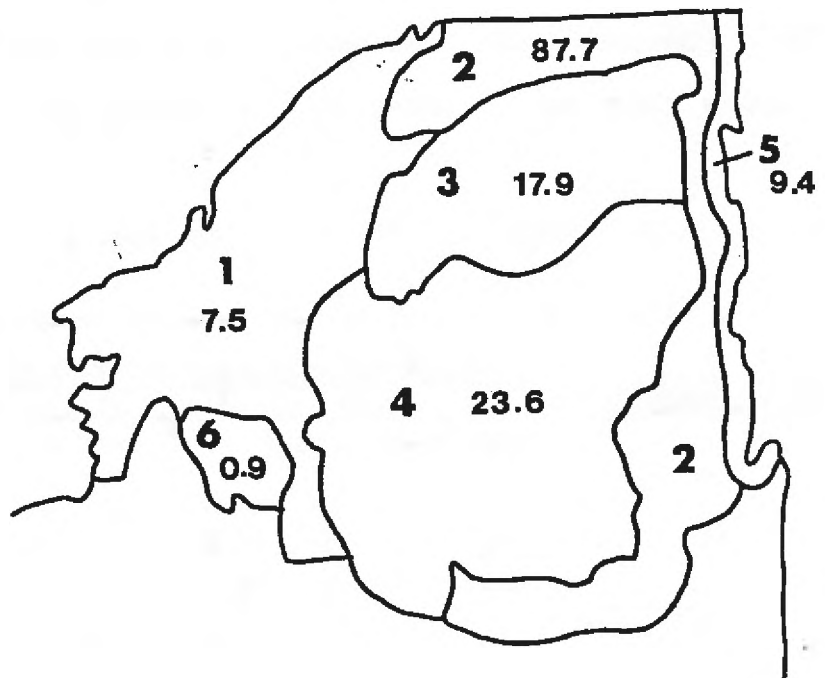
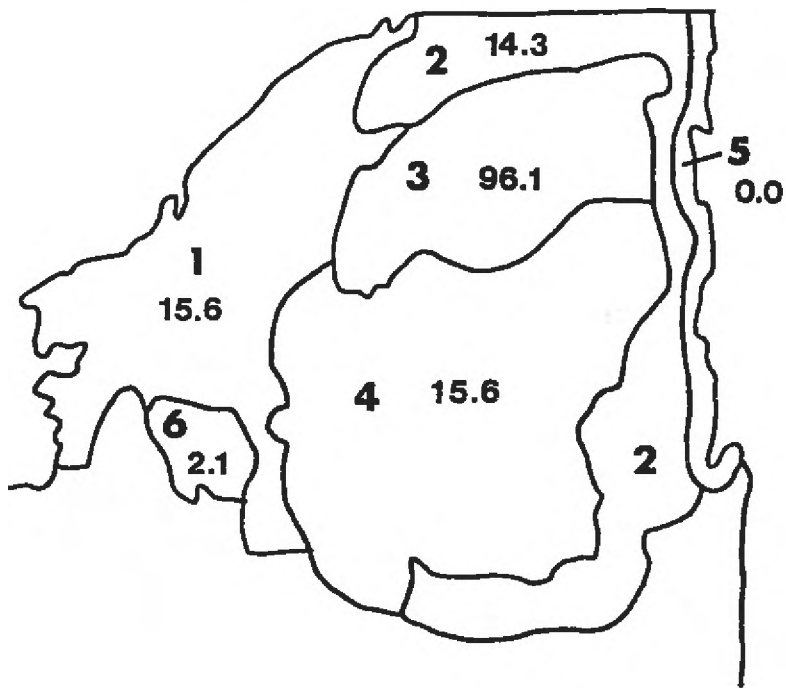


Figure 2. The Percent Who Trapped in Each WMU, by WMU of Residence.

Residents of WMU 3 n=77



Residents of WMU 4 n=95

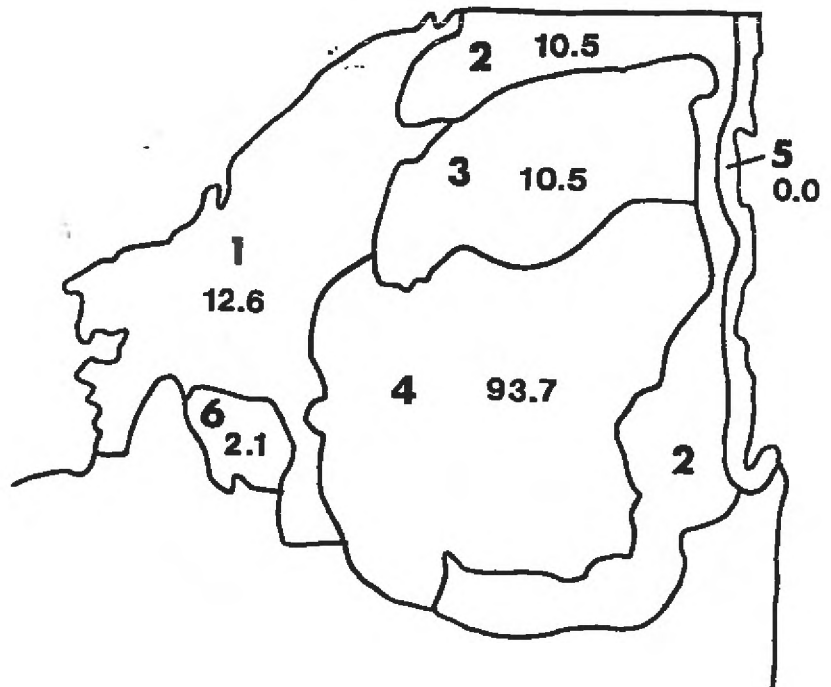
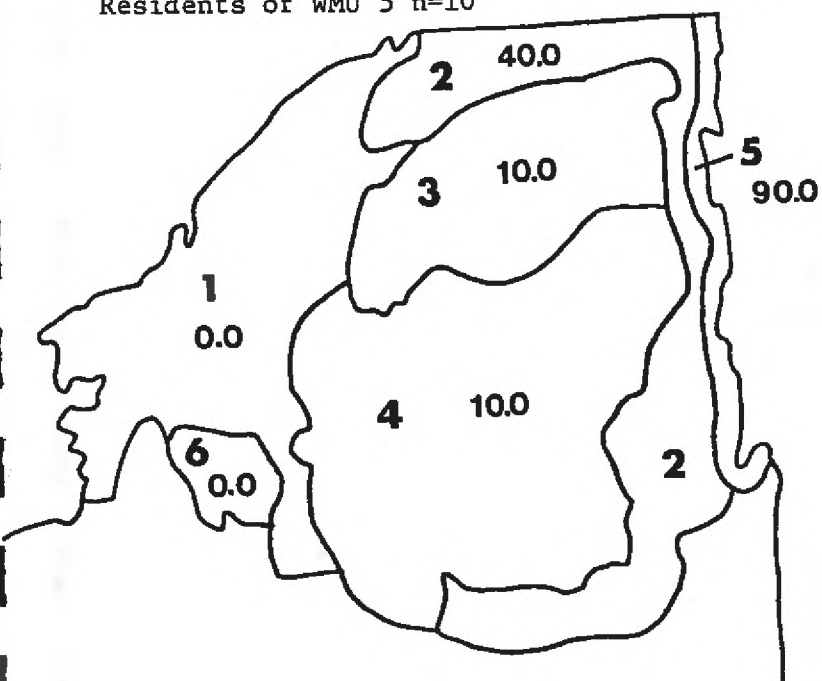
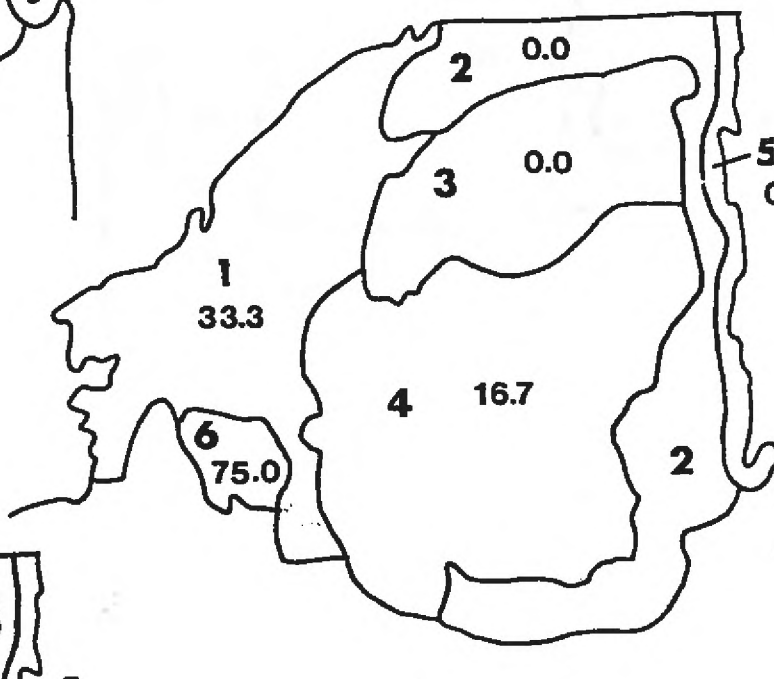


Figure 2 (continued).

Residents of WMU 5 n=10



Residents of WMU 6 n=12



Residents outside of study region n=44

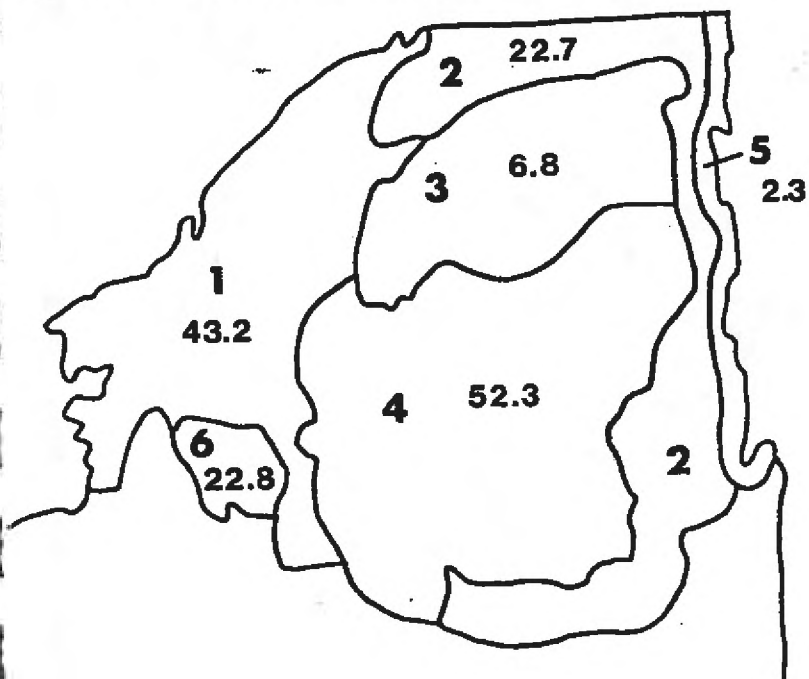


Figure 2 (continued).

Beaver trappers also trapped other kinds of furbearers during the past 3 seasons. About half of the total sample trapped mink and muskrat and nearly as many trapped other furbearers including raccoon, fox, and fisher (Table 6). While most additional trapping activity was reported in WMU 1, trapping for otter was most popular in WMU 4.

Table 6. Percent of Trappers Who Trapped Other Kinds of Furbearers During the Past 3 Seasons, by the WMU Where the Trapping Occurred.

WMU	Other Kinds of Furbearers Trapped During the Past 3 Seasons			
	Mink and Muskrat	Otter	Raccoon, Fox Fisher, etc.	None
	% of total sample (n=609)			
1	46.7 ^a	21.3	44.2	1.5
2	22.8	13.8	21.8	1.2
3	21.0	15.9	19.5	1.3
4	28.9	26.6	26.6	0.8
5	4.4	2.5	3.9	1.6
6	7.5	4.8	6.1	1.5

^aNote: Percents do not total 100% due to multiple response.

Trapping Conditions Preferred

Trappers were asked about the ground conditions and water conditions they preferred for trapping beaver. Overall, 45% preferred open water, 13% partial ice cover, 21% sound ice, and 22% indicated that "it doesn't matter." As for ground conditions preferred, 39% indicated it didn't matter, 26% preferred no snow, 16% light snow, and 18% preferred snow cover adequate for snowmobile use. Some differences in preferred conditions appeared when trappers were divided into those who took less than 10 beaver vs. those who took 10 or more beaver in 1984-85 (Table 7). Higher percentages of those trappers taking 10 or more beaver preferred sound ice and snow cover adequate for snowmobile use.

Table 9. Preference for Season Opening Date by WMU.

WMU	Preference for Opening Season Date											
	3rd wk OCT	4th wk OCT	1st wk NOV	2nd wk NOV	3rd wk NOV	4th wk NOV	1st wk DEC	2nd wk DEC	3rd wk DEC	4th wk DEC	1st wk JAN	2nd wk JAN
	%											
1	26.1*	12.5	21.4	12.8	5.9	2.1	3.9	1.5	0.6	0.3	1.5	0.0
2	9.8	8.7	6.9	10.4	5.8	1.7	4.6	1.2	0.0	0.0	4.0	1.7
3	20.2	10.7	16.7	14.3	6.5	1.2	3.0	2.4	0.0	0.0	1.8	0.6
4	10.4	5.0	11.3	5.9	4.5	1.8	3.2	1.4	1.8	0.5	2.3	0.5
5	7.3	2.4	17.1	14.6	4.9	7.3	0.0	2.4	0.0	0.0	7.3	0.0
6	11.8	10.3	19.1	2.9	4.4	5.9	2.9	4.4	0.0	0.0	1.5	0.0

	3rd wk JAN	4th wk JAN	1st wk FEB	2nd wk FEB	3rd wk FEB	4th wk FEB	1st wk MARCH	2nd wk MARCH	3rd wk MARCH	4th wk MARCH	1st wk APRIL	2nd wk APRIL	n
	%												
1	0.3	0.3	2.4	2.1	0.6	0.9	2.4	0.9	0.9	0.0	0.6	0.3	337
2	1.2	0.6	5.2	4.6	6.4	5.2	8.1	4.6	5.2	1.7	1.2	1.2	173
3	0.6	0.0	2.4	4.2	4.2	0.6	5.4	3.0	1.8	0.6	0.0	0.0	168
4	0.9	0.5	5.4	5.9	6.8	7.2	13.5	4.1	4.1	1.8	0.9	0.9	222
5	0.0	0.0	4.9	0.0	7.3	2.4	7.3	9.8	2.4	2.4	0.0	0.0	41
6	0.0	0.0	8.8	1.5	4.4	4.4	13.2	2.9	0.0	1.5	0.0	0.0	68

*Percentages in bold represent time spans where some consensus for an opening date preference may lie.

the existing late winter time frame and a fall opening. For WMUs 5 and 6, little agreement on opening dates was found. In WMU 5, the first 2 weeks in November were preferred by 32% of the trappers giving a preference for that WMU. In WMU 6, 41% preferred an opening date in the end of October or the first week in November.

Overall, 54% of trappers were opposed to a split season, 39% preferred such a season, and 7% had no opinion. Some trappers who preferred a split season provided unsolicited information on the opening date preference for that split season. The range of preferred opening dates for the split season in WMUs 1 through 4 (where the sample size was over 30) was the fourth week in February through the second week in March (Table 10).

For WMUs 1 and 2 there was some difference in the preference for an opening date between those who trapped in that WMU in 1984-85 and those who gave a preference but did not trap in that WMU. For those who trapped in WMU 1, the majority (87%) wanted the opening date in October or November (Table 11), while for those who did not trap in WMU 1 in 1984-85, there was no clear preference for an opening date. For WMU 2 an interesting split in preference was observed. Nearly half (49%) of those who trapped in WMU 2 preferred an opening date in February or March, while those who did not trap there in 1984-85 preferred an opening date in October or November (63%). No other WMU had statistically significant differences in preferences between those who trapped in that WMU and those who did not.

To gain some insight into why a trapper gave the opening date preference that he did, respondents were asked to indicate the reasons for their preference and to choose the most important reason. Results indicate the most important reason overall was "to get the best beaver pelt price." The 5 most-

Table 10. Respondents Who Preferred a Split Season and Volunteered a Date for the Opening of the Second Season, by WMU.

WMU	Preference for Split Season, Second Opening Date										n
	1st wk FEB	2nd wk FEB	3rd wk FEB	4th wk FEB	1st wk MARCH	2nd wk MARCH	3rd wk MARCH	4th wk MARCH	1st wk APRIL	2nd wk APRIL	
1	2.8	1.4	7.0	14.1*	33.8	18.3	9.9	5.6	2.8	4.2	71
2	12.5	0.0	3.1	18.8	21.9	21.9	9.4	6.3	6.3	0.0	32
3	2.9	5.9	2.9	14.7	26.5	14.7	8.8	5.9	11.8	5.9	34
4	5.8	5.9	2.9	17.6	23.5	20.6	8.8	2.9	8.8	2.9	34
5	27.3	9.1	9.1	18.2	18.2	9.1	9.1	0.0	0.0	0.0	11
6	0.0	0.0	7.7	23.1	23.1	23.1	15.4	0.0	7.7	0.0	13

*Percentages in bold represent time spans where some consensus for a second opening date preference may lie.

Table 11. Opening Date Preferences for WMUs 1 and 2 by Whether or Not the Respondent Trapped in that WMU in 1984-85.

For Those Who Gave an Opening Date Preference in WMU 1								
Trapped in WMU 1 in 1984-85*	Month of Opening Date Preference							n
	Oct.	Nov.	Dec.	Jan.	Feb.	March	April	
	%							
Yes	41.3	46.1	4.8	1.5	3.3	2.6	0.4	271
No	18.9	26.4	15.1	5.7	20.8	11.3	1.9	53
$(\chi^2 = 52.7, \text{d.f.} = 6, P = 0.05)$								
For Those Who Gave an Opening Date Preference in WMU 2								
Trapped in WMU 2 in 1984-85	Month of Opening Date Preference							n
	Oct.	Nov.	Dec.	Jan.	Feb.	March	April	
	%							
Yes	16.5	19.7	4.7	8.7	26.0	22.8	1.6	127
No	21.1	42.1	10.5	2.6	10.5	13.2	0.0	38
$(\chi^2 = 14.4, \text{d.f.} = 6, P = 0.05)$								

*Statistically significant difference between those who trapped in WMU in 1984-85 and those who did not.

frequently-checked reasons as well as the 5 reasons believed to be most important were the same for each WMU (Table 12). These were "to get the best beaver pelt price," "to engage in other trapping while beaver trapping," "to catch the most beaver," "to coincide with preferred weather conditions," and "to ensure preferred conditions to reach trapping areas." All of the remaining reasons listed in Table 12 were cited by less than one-fourth of the trappers giving a preference for a particular WMU.

Season opening preferences were examined relative to a respondent's most important reason for that season preference. We might expect, for example, that if late December - early January was the period when beaver

Table 12. Reasons for Season Opening Preferences and Rank of the Most Important Reason.

Reason for Preference	WMU 1			WMU 2			WMU 3			WMU 4			WMU 5			WMU 6		
	% who checked most imp.	Rank of	% who checked most imp.	% who checked most imp.	Rank of	% who checked most imp.	% who checked most imp.	Rank of	% who checked most imp.	% who checked most imp.	Rank of	% who checked most imp.	% who checked most imp.	Rank of	% who checked most imp.	% who checked most imp.	Rank of	% who checked most imp.
To get the best beaver pelt price	56.7	1	54.2	1	51.9	1	68.8	1	42.5	1	56.3	1						
To engage in other trapping while beaver trapping	52.0	2.5	35.5	5	42.9	2	33.8	5	22.5	4.5	39.1	2						
To catch the most beaver	45.8	2.5	42.8	4	48.1	3	44.5	4	37.5	2	40.6	4						
To coincide with preferred weather conditions	46.7	4	58.4	3	53.8	4	58.4	2	47.5	3	45.3	3						
To ensure preferred trapping conditions to reach trapping areas	51.9	5	62.7	2	53.2	5	60.7	3	45.0	4.5	46.9	5						
Avoid conflicts with other trapping interests	11.6	9	21.7	6	12.2	8.5	22.8	8.5	15.0	-	18.8	8						

Table 12 (continued).

Reason for Preference	WMU 1		WMU 2		WMU 3		WMU 4		WMU 5		WMU 6	
	% who checked most imp.	Rank of	% who checked most imp.	Rank of	% who checked most imp.	Rank of	% who checked most imp.	Rank of	% who checked most imp.	Rank of	% who checked most imp.	Rank of
So trapping pressure will be spread out	18.2	11	19.3	9	15.4	8.5	24.2	6.5	27.5	-	25.0	8
Hunt same time as beaver trapping	25.4	7.5	13.3	-	25.0	7	16.4	8.5	7.5	-	14.1	-
Avoid conflicts with hunting season	12.5	7.5	18.1	9	16.0	-	21.0	10	20.0	-	15.6	8
To coincide with other season	18.2	11	18.1	9	22.4	-	33.0	-	20.0	6.5	23.8	8
Trap during vacation	8.8	11	9.1	-	8.4	-	6.4	-	10.3	-	4.8	-
Other reason	17.5	6	13.5	7	17.6	6	16.3	6.5	21.1	6.5	18.3	8

- not mentioned by anyone as being "most important" reason

prices were the highest and therefore sometime before that, say November, was the best time to open the trapping season, those respondents whose most important reason was "to get the best beaver pelt price" would cluster around that November date. However, Table 13 shows that there was no consensus about when the season should be opened to receive the best pelt price. The nearest agreement was the first 2 weeks in November where nearly one-third of the responses were grouped. If the most important reason was "to catch the most beaver," nearly one-third (30%) of the responses were for the third week in October and 79% were in October and November. Responses for preferred weather and trapping conditions clustered around October-November and February-March.

Further analysis of those responses where trapping conditions were most important shows that for those who preferred ground conditions of no snow or light snow, the majority wanted the season to open in October through December (Table 14). Those who wanted a heavier snow cover preferred opening dates in February or March. Although sample sizes were small, these preference data appear consistent with weather patterns in Northern New York. Similar results occurred for water conditions; the majority of responses for open water (58%) were in October-November and the majority for sound ice (63%) were in February.

Trappers' opinions about when beaver should be taken to get the best price were examined for those trappers who reported wanting to get the best pelt price as a reason for their season preference. Slightly over one-third indicated that November was the best time (Table 15). The remainder of responses were relatively evenly distributed from December to March, with few in October. The majority of respondents (70%) believed that the ending date for the best pelt prices was in March-April.

Table 13. The Five Most Important Reasons for Season Opening Preference by the Date of Preference.

Most Important Reason for Preference	Preference for Opening Season Date												n of responses
	3rd wk OCT	4th wk OCT	1st wk NOV	2nd wk NOV	3rd wk NOV	4th wk NOV	1st wk DEC	2nd wk DEC	3rd wk DEC	4th wk DEC	1st wk JAN	2nd wk JAN	
	%												
To get the best beaver pelt price	3.8	2.2	15.1*	16.1	2.7	1.6	5.4	2.7	1.6	0.0	1.6	2.2	186
To engage in other trapping while beaver trapping	18.9	35.1	21.6	6.8	2.7	0.0	2.7	9.5	0.0	0.0	0.0	0.0	74
To catch the most beaver	30.3	11.8	18.4	13.2	5.3	0.0	0.0	0.0	1.3	0.0	0.0	1.3	76
To coincide with preferred weather conditions	18.2	9.1	13.0	9.1	2.6	0.0	3.9	0.0	0.0	0.0	0.0	0.0	77
To ensure preferred trapping conditions to reach trapping areas	11.9	3.0	7.5	6.0	1.5	0.0	4.5	3.0	0.0	0.0	1.5	0.0	67
To get the best beaver pelt price	1.6	1.1	11.3	5.9	5.9	3.2	10.2	3.8	1.1	0.0	0.0	1.1	186
To engage in other trapping while beaver trapping	0.0	0.0	0.0	0.0	0.0	1.4	1.4	0.0	0.0	0.0	0.0	0.0	74
To catch the most beaver	0.0	1.3	0.0	0.0	1.3	2.6	1.3	7.9	1.3	0.0	0.0	2.6	76
To coincide with preferred weather conditions	0.0	0.0	0.0	2.6	6.5	9.1	10.4	5.2	9.1	1.3	0.0	0.0	77
To ensure preferred trapping conditions to reach trapping areas	0.0	0.0	6.0	13.4	4.5	10.4	10.4	3.0	7.5	3.0	3.0	0.0	67

*Percentages in bold represent time spans where agreement between season opening preferences and most important reasons was highest.

Table 14. Trapping Conditions Preferred by Month of Season Opening For Those Trappers Whose Most Important Reason for Season Opening Preference was Trapping Conditions.

Water Conditions Preferred	Month of Opening Date Preference							n
	Oct.	Nov.	Dec.	Jan. %	Feb.	March	April	
Open water	36.9	21.1	10.6	0.0	5.3	21.1	5.3	19
Partial ice cover	0.0	8.4	25.0	0.0	33.3	33.3	0.0	12
Sound ice	0.0	12.5	0.0	0.0	62.5	25.0	0.0	24
It doesn't matter	12.5	12.5	0.0	12.5	37.5	12.5	12.5	8
Ground Conditions Preferred								
No snow	42.9	14.3	0.0	0.0	7.2	28.6	7.2	14
Light snow cover	5.9	29.5	29.5	0.0	11.8	23.6	0.0	17
Snow cover adequate								
for snowmobile use	0.0	0.0	0.0	0.0	79.0	21.0	0.0	19
It doesn't matter	13.4	13.4	0.0	13.4	33.4	26.7	13.4	15

Table 15. Time of Year Beaver Should be Taken to Receive the Best Pelt Price as Indicated by Those Trappers Whose Most Important Reason for Season Preference was "to Get the Best Beaver Pelt Price".

Month	When Beaver Should be Taken to Get the Best Pelt Price	
	Start	End
	%	
Oct.	3.3	0.0
Nov.	36.7	0.8
Dec.	14.2	8.3
Jan.	16.7	7.5
Feb.	19.2	12.5
March	10.0	33.3
April	0.0	36.7
May	0.0	0.8
	100.0	100.0
n	120	120

Overall, pre-season pelt prices were reported to typically affect the trapping effort of 37% of the trappers and sometimes affect that of 24% of trappers; for 38% of trappers pre-season prices had no effect on their trapping effort. Table 16 shows the times when, according to respondents, beaver and otter should be taken to get the best price. A majority believed otter should be taken in November (61%) through December-January (56%). The suggested beaver season opening dates were similar to those dates presented previously for trappers where pelt price was the most important reason for season preference.

Table 16. Perceived Time of Year Beaver and Otter Should be Taken to Receive the Best Price.

Month	Animals Taken to Get the Best Price				
	Beaver		%	Otter	
	Start	End		Start	End
Sept.	0.2	0.0		0.6	0.0
Oct.	9.5	0.0		13.4	0.0
Nov.	36.0	1.6		61.4	3.7
Dec.	16.1	10.6		11.9	33.4
Jan.	10.8	6.5		3.2	22.4
Feb.	13.6	11.0		5.2	11.0
March	13.4	30.2		4.1	12.7
April	0.4	39.5		0.2	16.7
May	0.0	0.7		0.0	0.0
Total	100.0	100.0		100.0	100.0
n	566	557		464	455

SUMMARY AND CONCLUSIONS

No specific week or set of weeks for opening beaver trapping seasons in Northern New York was preferred by a majority of trappers in any WMU. However, the results of this study indicated a general preference for a fall season opening in most WMUs, with a notable minority wanting a late winter season in WMUs 2 and 4. There was little support for a split season in any WMU. Trappers also provided rationales for their preferences, with most indicating that their preferred opening date reflected the timing necessary to realize the best prices for beaver pelts. For those who had preferences for particular ground or water conditions, their opening date preferences generally corresponded to the conditions that could be expected during those times.

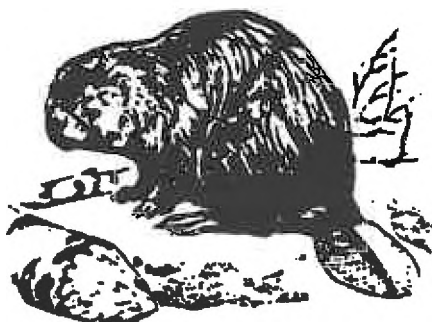
Using the data obtained from this study, furbearer managers might be able to develop a set of criteria for establishing season opening dates which are based partially on the elements in trappers' reasons for season preferences. These might include items such as expected pelt price, ground conditions, water conditions, and correspondence with other trapping and/or hunting seasons. Certainly these have already been a part of the management decision-making process; however, the data reported herein may help managers put "weights" on the relative importance of these factors from the trappers' perspective. While decision making will remain qualitative to a large degree, the results of this study will help make the process more explicit and documentable (i.e., communicated more easily).

-25-

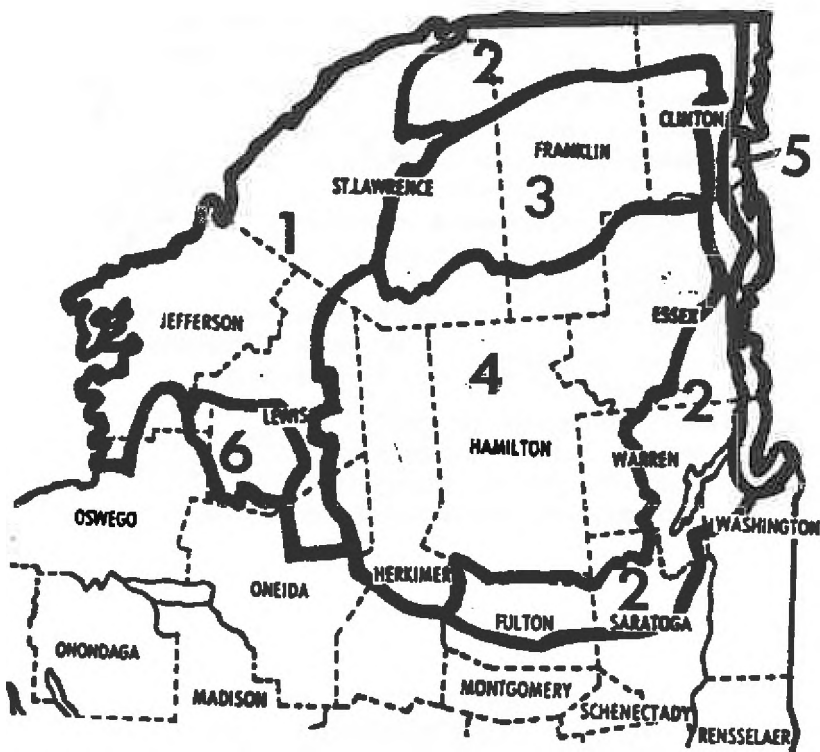
APPENDIX A

Questionnaire and Cover Letters

**NORTHERN NEW YORK
BEAVER TRAPPING
SEASON:
TRAPPER PREFERENCE
SURVEY**



Wildlife Management Units (WMU's) in Northern New York



NORTHERN NEW YORK BEAVER TRAPPING SEASON:

TRAPPER PREFERENCE SURVEY

Conducted by the
Department of Natural Resources
New York State College of Agriculture and Life Sciences
Cornell University

This survey is being conducted to determine the season preferences and other characteristics of beaver trappers in Northern New York. The New York State Department of Environmental Conservation has asked us to obtain this information for purposes of evaluating current beaver trapping season opening dates in Wildlife Management Units 1 through 6 (formerly called Furbearer Management Units) of Northern New York. Names for this survey were obtained from 1984-85 pelt tagging records of successful beaver trappers. DEC furbearer management biologists are seeking an accurate assessment of trappers' preferences, which will be considered when establishing future trapping seasons. Your input is essential for them to accomplish this.

We would like the addressee to complete this brief questionnaire as soon as possible, seal it, and simply drop it in the mail: return postage has been provided. We have designed this questionnaire to be easy to answer—you simply fill in blanks and check or circle answers. Your answers will remain confidential. Your assistance with this survey is critical to assuring that beaver management in Northern New York adequately considers trappers' preferences and beaver biology.

THANK YOU FOR YOUR COOPERATION.

TRAPPING EXPERIENCE

1. How many years have you trapped for beaver? ____ years
2. During each of the past three beaver trapping seasons, how many days did you have traps set for beaver? (Put a zero [0] in for seasons you did not set traps for beaver.)

<u>Season</u>	<u>Days Trap Set</u>
1982-83	____ days
1983-84	____ days
1984-85	____ days

3. How many beaver did you trap during each season? (Put a zero [0] in for seasons you did not catch any beaver.)

<u>Season</u>	<u>Number of beaver trapped</u>
1982-83	____ beaver
1983-84	____ beaver
1984-85	____ beaver

- 4a. In which wildlife management units (WMUs) did you go trapping for beaver during the last 3 seasons? (Please circle all the WMUs where you went trapping for beaver during each season.)

<u>Trapping Season</u>	<u>W M U #</u>					
1982-83	1	2	3	4	5	6
1983-84	1	2	3	4	5	6
1984-85	1	2	3	4	5	6

- 4b. Now, for each season above, please put an "X" through the single WMU number where you spent the most time trapping beaver.

5. What other kinds of furbearers have you gone trapping for in the past three seasons and where? (Circle the appropriate WMUs for each kind of furbearer.)

Other Kinds of Furbearers Trapped During Past Three Seasons	W M U #					
Mink and muskrat	1	2	3	4	5	6
Otter	1	2	3	4	5	6
Raccoon, fox, coyote, fisher, etc.	1	2	3	4	5	6
None	1	2	3	4	5	6

TRAPPER PREFERENCE

6. Our experience in talking with trappers has shown that beaver trappers have particular preferences for trapping conditions. For the conditions listed below, please indicate your preference by placing a check beside the situation you prefer for beaver trapping.

a) Ground conditions? _____ snow cover adequate for
(Check one.) _____ snowmobile use
_____ light snow cover
_____ no snow
_____ it doesn't matter

b) Water conditions? _____ ice sound enough to walk on
(Check one.) _____ partial ice cover
_____ open water
_____ it doesn't matter

c) Are there any other trapping conditions you prefer? If so, please specify:

7. Our experiences with trappers have also indicated considerable differences in preferred timing for opening dates of beaver trapping seasons. Which week between mid-October and mid-April would suit you best for the season opening in each WMU where you typically trap or would consider trapping beaver? *Indicate your preference on the Table below by placing an "X" in the box that represents the week during which you would like the beaver trapping season to open in each WMU in which you have interest.*

Week of Month																								
WMU #	October		November				December				January				February				March				April	
	3th Wk	4th Wk	1st Wk	2nd Wk	3th Wk	4th Wk	1st Wk	2nd Wk	3th Wk	4th Wk	1st Wk	2nd Wk	3th Wk	4th Wk	1st Wk	2nd Wk	3th Wk	4th Wk	1st Wk	2nd Wk				
1																								
2																								
3																								
4																								
5																								
6																								

8. Do you prefer some form of a "split" season, such as currently exists in WMUs 1 and 3?

☐ Yes, I prefer a split season.
☐ No, I prefer a straight season.
☐ No opinion.

9a. What were your reasons for the season opening preferences you gave for each WMU in Question 7? (Under each WMU for which you gave a season opening preference in Question 7, place a check mark ☒ indicating those reasons that influenced your preference.)

	WMU #					
Reasons for season preferences:	1	2	3	4	5	6
a) To get the best beaver pelt price . . .	—	—	—	—	—	—
b) To catch the most beaver	—	—	—	—	—	—
c) To coincide with the otter season during the time of maximum expected otter pelt price	—	—	—	—	—	—
d) To ensure the kind of trapping conditions I prefer to reach my trapping areas	—	—	—	—	—	—
e) To coincide with weather conditions I prefer for trapping	—	—	—	—	—	—
f) So I can engage in other kinds of trapping during the same time I'm beaver trapping	—	—	—	—	—	—
g) So I can engage in hunting during the same time I'm beaver trapping	—	—	—	—	—	—
h) So I can avoid conflicts with other kinds of trapping I'm interested in	—	—	—	—	—	—
i) So I can avoid conflicts with hunting seasons	—	—	—	—	—	—
j) So trapping pressure will be spread out	—	—	—	—	—	—
k) So I can trap during my vacation	—	—	—	—	—	—
l) Other reasons (please specify):	—	—	—	—	—	—
_____	—	—	—	—	—	—
_____	—	—	—	—	—	—

9b. For each WMU above, please circle the check mark you made for the one most important reason that influenced your season opening preference.

ADDITIONAL INFORMATION

10. What is the number of the Wildlife Management Unit in which you reside? (Refer to the map on the inside-front cover.)

WMU ____.

11. Do you belong to any local, regional, state, or national trapping organizations?

____ No

____ Yes

If "yes", please list below:

12. Do pre-season predictions of beaver pelt prices affect how hard you will trap for beaver during that season?

____ Yes

____ No

____ Sometimes

13. In your opinion,

a) when should beaver be taken to get the best price?

(Give dates: from _____ to _____)

b) when should otter be taken to get the best price?

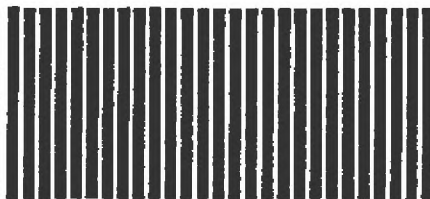
(Give dates: from _____ to _____)

Thank you for your assistance in this survey. Please use the space below for any additional comments you wish to make regarding beaver trapping in Northern New York.

TO RETURN THIS QUESTIONNAIRE, simply seal it and place it in the mail; return postage has been provided.



NO POSTAGE
NECESSARY
IF MAILED
IN THE
UNITED STATES



BUSINESS REPLY MAIL

FIRST CLASS PERMIT NO. 878 ITHACA, N.Y.

POSTAGE WILL BE PAID BY ADDRESSEE

CORNELL UNIVERSITY
Natural Resources, K. Purdy & D. Decker
P.O. Box DH
Ithaca, New York 14851-9978





New York State College of Agriculture and Life Sciences
a Statutory College of the State University
Cornell University

Department of Natural Resources
Fernow Hall, Ithaca, N. Y. 14853-0188

Fishery Science
Forest Science
Wildlife Science
Natural Resources
Resource Policy
and Planning
Aquatic Science

October 9, 1985

Dear Trapper:

The New York State Department of Environmental Conservation (DEC) is evaluating the beaver trapping season opening dates for Northern New York. As part of this effort, Cornell University has been asked to determine the preferences and other characteristics of individuals who trap for beaver in the Northern New York region.

You have been identified as such an individual through the 1984-85 pelt tagging records of successful beaver trappers. Your views are, therefore, extremely important. By answering the enclosed questionnaire, the information you provide will help establish beaver trapping season opening dates that better meet your needs and those of other trappers in Northern New York.

To report accurately the preferences of beaver trappers, we need a completed questionnaire from everyone surveyed. We want your reply even if you have few season opening preferences or even if you do not intend to trap again in Northern New York. Simply complete the questionnaire, seal it, and drop it in the mail; postage has been provided. All information you provide will be kept confidential and is never associated with your name.

Thank you for your assistance.

Sincerely,

Ken G. Purdy
Research Support Specialist
Natural Resources

Daniel J. Decker
Research Associate
and
Wildlife Extension Specialist
Natural Resources



New York State College of Agriculture and Life Sciences
a Statutory College of the State University
Cornell University

Department of Natural Resources
Fernow Hall, Ithaca, N. Y. 14853-0188

Fishery Science
Forest Science
Wildlife Science
Natural Resources
Resource Policy
and Planning
Aquatic Science

October 16, 1985

Dear Trapper:

About a week ago we sent you a questionnaire to obtain your opinions of the beaver trapping season opening dates for Northern New York. If you have already returned your questionnaire, please accept our sincerest thanks. If you have not yet had an opportunity to complete your questionnaire, please take a few minutes today to complete it so that we can process your information as soon as possible.

To establish beaver trapping season opening dates that better meet your needs and those of other trappers in Northern New York, we need a completed questionnaire from everyone surveyed. We want your reply even if you have few season opening preferences or even if you do not intend to trap again in Northern New York.

All information you provide will be kept confidential and is never associated with your name. Return postage has been provided on the questionnaire, so just seal it and drop it in the mail.

Sincerely,

Ken G. Purdy
Research Support Specialist
Natural Resources

Daniel J. Decker
Research Associate and
Wildlife Extension Specialist
Natural Resources



New York State College of Agriculture and Life Sciences
a Statutory College of the State University
Cornell University

Department of Natural Resources
Fernow Hall, Ithaca, N. Y. 14853-0188

Fishery Science
Forest Science
Wildlife Science
Natural Resources
Resource Policy
and Planning
Aquatic Science

October 29, 1985

Dear Trapper:

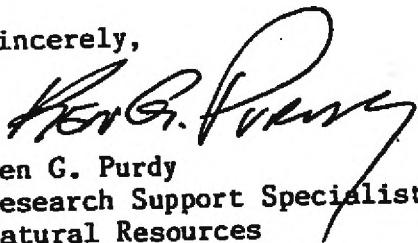
About three weeks ago we sent you a questionnaire to obtain your opinions of the beaver trapping season opening dates for Northern New York. To date, we have not received your reply. If you have not yet completed the questionnaire, we urge you to take a few minutes now to do so.


We hope you understand that your response is important both to the success of this study and to the future of beaver management in Northern New York. We need to receive your reply whether you have any season opening preferences or even if you do not intend to trap again in Northern New York.

In case you have misplaced the earlier questionnaire, we have enclosed another for your convenience. Return postage has been provided on the questionnaire, so just seal it and drop it in the mail.

Please take a few minutes now to complete the questionnaire. Your cooperation will be greatly appreciated.

Sincerely,


Ken G. Purdy
Research Support Specialist
Natural Resources


Daniel J. Decker
Research Associate and
Wildlife Extension Specialist
Natural Resources

/sa